Business Economics

Fast-Track Revision

What Determines Demand? / Factors Affecting Demand

✗ *Price of the commodity:*

Price ↑ ↓ Quantity Demanded ↓ ↑

Inverse Relation

Meaning of Demand

Need/ Desire
+
Ability to Pay
+
Willingness to Purchase

What Determines Demand? / Factors Affecting Demand

✗ *Price of related commodities:*

(a) complementary goods

Price of Pen ↑ ↓ Demand of Ink ↓ ↑

Inverse Relation

Demand in economics means an **effective desire** for a commodity i.e. **desire backed by the 'ability to pay' and 'willingness to pay' for it.**

What Determines Demand? / Factors Affecting Demand

✗ *Price of related commodities:*

(b) competing goods or substitutes

Price of Ball Pen ↑ ↓ Demand of Ink Pen ↑ ↓

Positive Relation

What Determines Demand? / Factors Affecting Demand

- *Level of income of the household*

Income ↑↓ Demand ↑↓

Positive Relation

What Determines Demand? / Factors Affecting Demand

- *Tastes and preferences of consumers:*

Taste and Preference → ← Demand ↑↓

Demonstration Effect

What Determines Demand? / Factors Affecting Demand

- *Level of income of the household*

In case of Inferior Goods

Income ↑↓ Demand of Inferior Goods ↓↑

Inverse Relation

What Determines Demand? / Factors Affecting Demand

- *Tastes and preferences of consumers:*
- Demonstration effect > James Duesenberry > the desire of people to copy the consumption behavior of others.
- Bandwagon effect > desire of people to purchase a commodity in order to be fashionable or stylish or to conform to the people they wish to be associated with.

What Determines Demand? / Factors Affecting Demand

- *Level of income of the household:*
- In case of Necessaries as the income of household increases, the demand for necessaries also increases in the beginning and becomes income inelastic (constant) thereafter.

What Determines Demand? / Factors Affecting Demand

- *Tastes and preferences of consumers:*
- Snob effect > the extent to which the demand for a consumers' good is decreased owing to the fact that others are also consuming the same commodity.
- Veblen effect > Thorstein Veblen > Highly priced goods are consumed by status seeking rich people to satisfy their need for conspicuous consumption.
- The distinction of Snob & Veblen
- Snob effect > function of the consumption of others
- Veblen > function of price.

What Determines Demand? / Factors Affecting Demand

- *Future Expectations about Price:*
- If there is future expectation about rise in price than at present, demand rises.
- If there is future expectation about fall in price then at present, demand falls.

What Determines Demand? / Factors Affecting Demand

- *Other Factors:*
- National Income & Distribution of National Income:

National Income ↑↓ Demand ↑↓

Distribution of National Income = ≠ APC ↑↓ Demand ↑↓

What Determines Demand? / Factors Affecting Demand

- *Other Factors:*
- Size of population:

Population ↑↓ Demand ↑↓

What Determines Demand? / Factors Affecting Demand

- *Other Factors:*
- Consumer-credit facility:

Consumer-credit facility ↑↓ Demand ↑↓

What Determines Demand? / Factors Affecting Demand

- *Other Factors:*
- Age Distribution of population/ Composition of Population:

Children ↑ Youth ↑ Old Age ↑

What Determines Demand? / Factors Affecting Demand

- *Other Factors:*
- Interest Rates:

Interest rates ↑↓ Demand ↓↑

Government Policies & Regulations:

'Quantity supplied' and 'factor price' do not determine demand.

D = f (P, Pr, Y, T, E, O)

The Law of Demand

Ceteris Paribus (Other things being equal) when

Price of a Commodity ⬆⬇ Quantity Demanded ⬇⬆

Rational for the Law of Demand

- ✗ Substitution Effect:
- ✗ When……the goods are closer substitutes
- ✗ there is lower cost of switching to the substitute good
- ✗ there is lower inconvenience while switching to the substitute good
- ✗ Income Effect:
- ✗ Price Effect (PE) = Substitution Effect (SE) + Income Effect (IE)
- ✗ Number of Consumers/ Arrival of New Consumers:
- ✗ Law of Diminishing Marginal Utility (Law of DMU):
- ✗ Different uses:

Individual Demand Schedule

Individual Demand Schedule represents the demand of an individual consumers

Price of Sugar Rs. Per Kg.	Quantity Demanded Kgs. Per month
1	5
2	4
3	3
4	2
5	1

Exceptions to the Law of Demand

Conspicuous goods:

- ✗ Articles of prestige value or snob appeal or articles of conspicuous consumption
- ✗ Found out by Veblen : doctrine of "Conspicuous Consumption" : effect is called Veblen effect or prestige goods effect.

Giffen goods: Sir Robert Giffen, British workers, Main food- Bread and Meat

Market Demand Schedule

Price of sugar Rs. Per kg.	Quantity Demanded p.m. kgs.		Market Demand A + B
	Consumer A	Consumer B	
1	5	6	5 + 6 = 11
2	4	5	4 + 5 = 9
3	3	4	3 + 4 = 7
4	2	3	2 + 3 = 5
5	1	2	1 + 2 = 3

Market Demand means horizontal summation of individual demands.

Market Demand curve is flatter than individual demand curve.

Exceptions to the Law of Demand

Conspicuous Necessities:

Future Expectations about Prices:

Irrational and Impulsive Purchases:

Demand for Necessaries:

Speculative Goods:

Ignorance Effect:

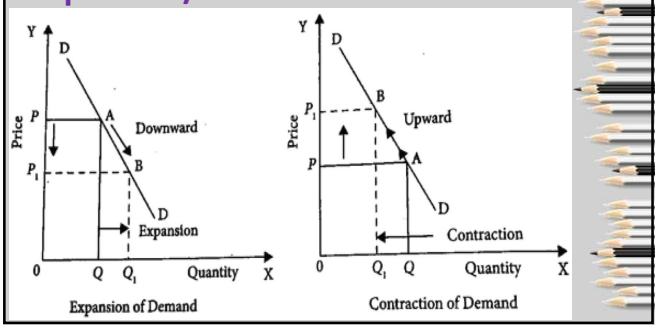
Effects on Demand

Change In Price	Change In Factors Other Than Price
Change In Quantity Demanded	Change In Demand
Expansion-Contraction In Demand	Increase-Decrease In Demand
Movement Along the Same Demand Curve	Shift of Demand Curve

Elasticity of Demand

Elasticity of demand is defined as
the responsiveness
of
the quantity demanded of a good
to
changes in one of the variables on which demand depends.

Expansion/ Contraction in Demand



Different Elasticities of Demand

- **Price Elasticity:-**

$$E_d = \frac{\text{percentage Change in Quantity Demanded}}{\text{Percentage Change in Price}}$$

- **Income Elasticity:-**

$$E_y = \frac{\%\text{ Change in Quantity Demanded}}{\%\text{ Change in Income}}$$

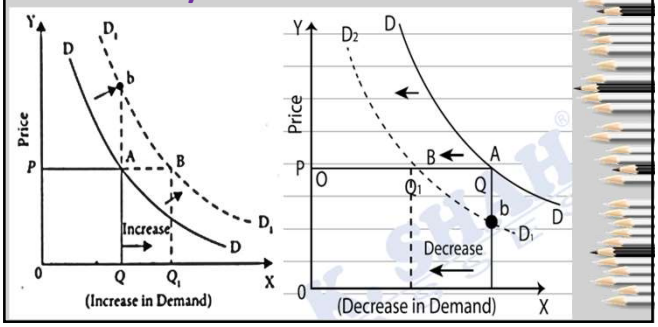
- **Cross Elasticity:-**

$$E_c = \frac{\%\text{ Change in Quantity Demand of 'X'}}{\%\text{ Change in Price of 'Y'}}$$

- **Advertisement Elasticity:-**

$$E_a = \frac{\%\text{ Change in Quantity Demand}}{\%\text{ Change in Spending on Advertising}}$$

Increase/ Decrease in Demand



Measurement of Price Elasticity of Demand

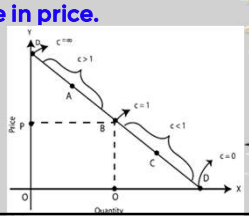
- **Percentage or Ratio or Proportional Method:**
- **$\Delta q/\Delta p \times p/q$**
- **The total Outlay or Expenditure Method or Seller's Total Revenue Method:**
- **Total Outlay (TO) = Price (P) X Quantity (Q)**

Price per unit (Rs.)	Quantity Demanded	Total Outlay (PXQ)	Elasticity of Demand
5	20 units	100	Ep = 1
4	25 units	100	Unitary
5	20 units	100	Ep > 1
4	30 units	120	Elastic
5	20 units	100	Ep < 1
4	22 units	80	Inelastic

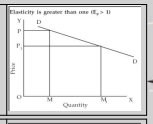
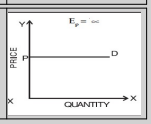
Measurement of Price Elasticity of Demand

- The Point Method or Geometric Method:
- To find elasticity at a given point on a demand curve.
- When there is minor change in price.

$$= \frac{\text{lower segment}}{\text{upper segment}}$$



Degree/Types of Elasticities of Demand

Greater than One, Less than Infinite	% change in demand is more than % change in price	Elastic Demand	
Infinite	Huge change in demand as a result of small change in price	Perfectly Elastic Demand	

Measurement of Price Elasticity of Demand

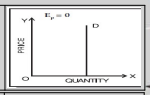
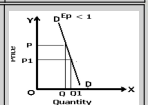
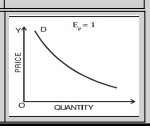
- The Arc Elasticity Method:
- To find out elasticity between two point of a demand curve.
- When there is major change in the price.

$$Ep = \frac{q1-q2}{q1+q2} \times \frac{P1+P2}{P1-P2}$$

Determinants of Price Elasticity of Demand

- Availability of Substitutes:
- Substitutes Available – Elastic
- Substitutes Not Available – Inelastic
- Position of a commodity in the Consumer's Budget:
- Large Portion – Elastic
- Small Portion – Inelastic
- Nature of the Commodity:
- Luxurious Need – Elastic
- Necessity Need – Inelastic

Degree/Types of Elasticities of Demand

Zero	No change in demand as a result of change in price	Perfectly Inelastic Demand	
Greater than Zero, Less than One	% change in demand is less than % change in price	Inelastic Demand	
One	% change in demand is equal to % change in price	Unit Elastic Demand	

Determinants of Price Elasticity of Demand

- Number of Uses:
- Multiple Uses – Elastic
- Single Use – Inelastic
- Time Period:
- Short Period – Inelastic
- Long Period – Elastic
- Consumer Habits:
- Habituated Goods – Inelastic
- Non-habituated Goods – Elastic

Determinants of Price Elasticity of Demand

- Tied Demand/Joint Demand:
- Tied with others - Inelastic
- Not Tied with others - Elastic
- Price Range:
- High & Low Range - Inelastic
- Medium Range - Elastic

Advertisement Elasticity of Demand

- Advertisement Elasticity:-

$$Ea = \frac{\text{\% Change in Quantity Demand}}{\text{\% Change in Spending on Advertising}}$$

- Ea = ΔQ/ ΔA * A/Q
- Advertisement Elasticity is typically positive.
- Advertisement Elasticity varies between 0 and ∞.

Elasticity	Interpretation
Ea = 0	Demand does not respond at all to increase in advertisement expenditure
Ea >0 but < 1	Increase in demand is less than proportionate to the increase in advertisement expenditure
Ea = 1	Demand increase in the same proportion in which advertisement expenditure increase
Ea> 1	Demand increase at a higher rate than increase in advertisement expenditure

Income Elasticity of Demand

- Zero income elasticity (EY=0)
- Salt, match box, lifesaving drugs
- Negative income elasticity (EY < 0)
- inferior good, second hand products (Inverse relation)
- Unitary income elasticity (EY = 1)
- Normal goods
- Income elasticity greater than one (EY > 1)
- Luxury goods, superior good (direct relation)
- Income elasticity less than one (EY < 1)
- Necessaries good, perishable goods.

Demand Forecasting

- Demand forecasting is an estimate of the future market demand for a product.
- The process of forecasting is based on reliable statistical data of past and present behavior, trends, etc.

Cross Elasticity of Demand

- Cross Elasticity for Substitutes:
- Always Positive
- Cross Elasticity for Complementary:
- Always Negative
- Cross Elasticity for Perfect Substitutes:
- Infinite
- Cross Elasticity for Neutral/unrelated goods:
- Zero

Types of Forecasting

- Micro or Macro-level forecasting:
- Industry-level forecasting
- Firm-level forecasting
- Based on time period:
- Short-term forecasting (Tactical Decisions)
- Long-term forecasting (Strategic Decisions)

Demand Distinction

- Producers goods :: Consumer goods
- Durable goods :: Non –Durable goods
- Derived demand :: Autonomous demand
- Industry demand :: Company demand
- Short –run demand :: Long –run demand

Utility

- Utility is the power of a commodity to satisfy human wants.
- In other words, utility may be defined as the satisfaction derived from the consumption of a good.
- It is a subjective entity and differs from person to person, time to time and place to place.

Wants

- Wants are unlimited
- Satiable
- Competitive
- Complementary
- Alternative
- Wants vary with time, place and person
- Wants influenced by advertisement

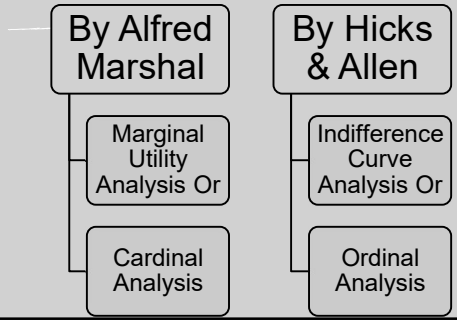
Utility

- Utility (expected utility) is different from satisfaction (realized utility).
- But when economists speak of the utility of a certain good, they are referring to the satisfaction gained from consuming the good.
- Utility differs from beneficial/usefulness.
- For example wine and poison have utility but not beneficial.

Classification of Wants

- Necessaries:
- Necessaries of Efficiency, Conventional Necessaries
- Comforts:
- Luxuries:

Theories of Consumer Behavior



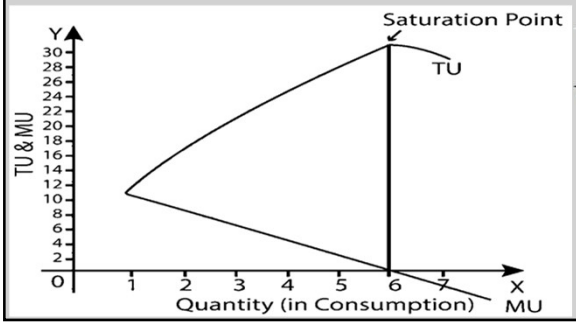
Marginal Utility Analysis

- **Total Utility (TU):** It is sum of utility derived from different units of commodity consumed by a consumer.
- TU = ΣMU or TU = MU1 + MU2 + MU3 ..... MUn etc.
- **Marginal Utility (MU):** It is additional utility derived from additional unit of a commodity.
- MU = ΔTU/Δ Q or TUn – TUn-1
- Utility is also known as 'Satiety'
- TU is known as 'Full Satiety'

Assumptions of Law of DMU

- Rationality
- The Cardinal Measurability of Utility
- Money is the measuring rod of utility
- All the other factors 'constant'
- Continuity in consumption
- All units are homogeneous or identical in nature
- All units must be standard units
- Constancy of the Marginal Utility of Money
- The Hypothesis of Independent Utility

Relation Between TU & MU



Limitations of Law of DMU

- Cardinal measurement of utility is not possible.
- Marginal utility of money (MUm) does not remain constant.
- Law is applicable if there are identical units, no change in habits, taste and income of the consumer.
- Law is applicable if there are standard unit- sufficient unit –neither more nor less.
- Law is applicable if there is no time-gap or interval between the consumption.
- Law may not apply to some article like gold, money, music and hobbies.

Law of DMU

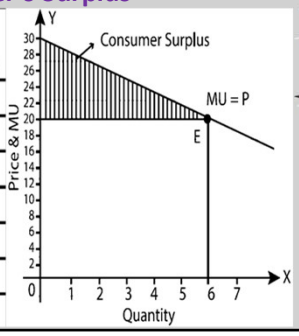
As a Consumer
Consumes
One additional Unit,
the Additional Satisfaction
Derived
from Additional unit
Goes on Decreasing.

Consumer's Surplus

- CS = What a Consumer Is Ready to Pay – What He Actually Pays
- 'What a consumer ready to pay' is taken in terms of 'MU' and what he actually pays' is taken in terms of 'Price'.
- CS = MU – P
- It is assumed that perfect competition prevails in the market
- It is used for Tax Policy and Price Discrimination in Monopoly Market.

Consumer's Surplus

Number of Units	Marginal Utility (Ready to Pay)	Price Actually Pays (in Rs.)	Consumer Surplus (in Rs.)
1	30	20	10
2	28	20	8
3	26	20	6
4	24	20	4
5	22	20	2
6	20	20	0 (MU = P)
7	18	20	



Indifference Curve Analysis

- Assumptions:
- The consumer is rational
- The consumer is capable of ranking
- If the consumer prefers combination A to B, and B to C, then he must prefer combination A to C. Law of Consistency or Transitivity.
- If combination A has more commodities than combination B, then A must be preferred to B. More is better.

Limitations of Consumer's Surplus

- Consumer's surplus cannot be measured because it is difficult to measure the MU.
- In the case of necessaries, the marginal utilities of the earlier units are highest. In such case, the consumer's surplus is always infinite.
- CS is affected by the availability of substitutes.
- There is no simple rule of deriving the utility of articles of prestige value such as diamond [water- diamond paradox]
- MU of money does not remain constant and this assumption is unrealistic.

Marginal Rate of Substitution

Marginal Rate of Substitution (MRS)
is
the rate
at which the consumer is prepared
to
exchange goods X and Y.

Meaning of Indifference Curve

An indifference curve
is a curve
which represents
all those combinations
of two goods
which give same satisfaction
to the consumer.

Reasons of Decreasing MRS

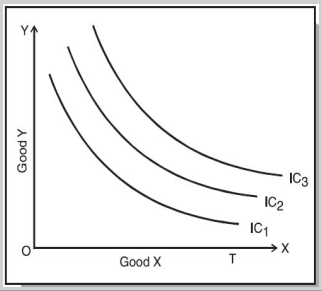
- The want for a particular good is satiable.
- Most of the goods are imperfect substitutes of one another.

Indifference Curve

Imperfect Substitute	MRS Decreasing	Convex to the Origin
Perfect Substitute	MRS Constant	Straight Line
Perfect Complementary	MRS Zero or Undefined	L Shaped
Production Possibility Curve	MRS Increasing	Concave to the Origin

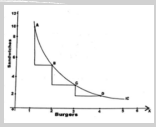
Indifference Curve Map

- Set of indifference curves is called indifference map.



Properties of Indifference Curve

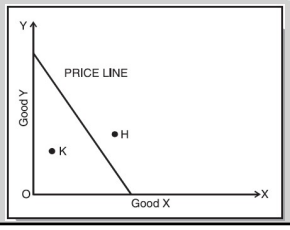
- IC is downward sloping & Convex



- Higher IC gives higher satisfaction

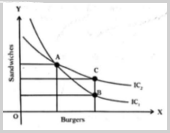
Budget Line

- Budget line shows all those combinations of two goods which the consumer can buy spending his given money income on the two goods at their prices.

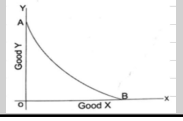


Properties of Indifference Curve

- Two IC will never Intersect each other



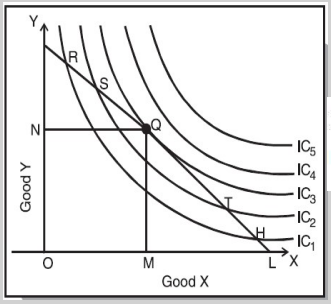
- IC will never touch the axis



Consumer's Equilibrium Under IC Analysis

- A consumer is in equilibrium when he is deriving maximum possible satisfaction from the goods and is in no position to rearrange his purchases of goods.
- Assumption:
- a. The consumer has a given indifference map (ICs).
- b. He has fixed money income.
- c. Price of goods are fixed.
- d. Goods are homogenous and divisible.

Consumer's Equilibrium Under IC Analysis



At equilibrium point Q,

$$MRS_{xy} = \frac{MU_x}{MU_y} = \frac{P_x}{P_y}$$

Determinants of Supply

- Price of Related Goods:

Price → Supply

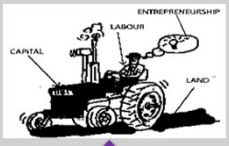
Meaning of Supply

- Supply of a commodity refers to the quantity of commodity offered for sale at a particular price during a given period of time.
- Supply is a flow.
- Flow> Data is measured on a period of time.
- Stock> Data is measured on a point of time.

Determinants of Supply

- Price of Factors of Production:

Price → Supply



Determinants of Supply

- Price of the Good:

Ceteris paribus (Other things being equal)

Price → Quantity Supplied

Positive relationship

Determinants of Supply

- State of Technology:

Technology → Supply

Determinants of Supply

✗ Government Policy:

Government Policy → Supply

Determinants of Supply

✗ Number of Sellers:

Large Number of Sellers → Supply

Small Number of Sellers → Supply

Determinants of Supply

✗ Nature of Competition and Size of Industry:

Competitive Condition → Supply

Monopolized Condition → Supply

Determinants of Supply

✗ Other Factors:

✗ The quantity supplied of a good also depends upon government's industrial and foreign policies, goals of the firm, infrastructural facilities, natural factors such as weather, floods, earthquake and man-made factors such as war, labor strikes, communal riots etc.

Determinants of Supply

✗ Future Expectations:

Future Rise in Price → Supply Today

Future Fall in Price → Supply Today

Law of Supply

Ceteris paribus (Other things being equal)

Price → Quantity Supplied

Effects on Supply

Change In Price	Change In Factors Other Than Price
Change In Quantity Supplied	Change In Supply
Expansion-Contraction In Supply	Increase-Decrease In Supply
Movement Along the Same Supply Curve	Shift of Supply Curve

Determinants of Elasticity of Supply

- Fewer barriers of entry > Elastic Supply
- Firms not working to full capacity > Elastic Supply
- Key raw materials and inputs are easily and cheaply available > Elastic Supply
- Firms have adequate stocks of raw materials > Elastic Supply
- Factors of production are commonly available > Elastic Supply
- Capital and labour are occupationally mobile > Elastic Supply

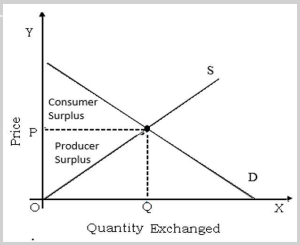
Elasticity of Supply

$$E_S = \frac{\text{Percentage change in quantity supplied}}{\text{Percentage change in price}}$$

$$= \frac{\Delta q}{\Delta p} \times \frac{p}{q}$$

- Perfectly Elastic Supply: Horizontal Supply Curve
- Perfectly Inelastic Supply: Vertical Supply Curve
- Unit Elastic Supply: Supply Curve Cutting Origin
- Elastic Supply: Supply Curve Cutting 'Y' Axis
- Inelastic Supply: Supply Curve Cutting 'X' Axis

Equilibrium Price



Determinants of Elasticity of Supply

- Substantial increase in costs, > Inelastic Supply
- Constant costs or negligible rise in costs > Elastic Supply
- More complex production processes > Inelastic Supply
- Long time of Production > Inelastic Supply
- Long Run > Elastic Supply
- Short Run > Inelastic Supply
- Large number of producers > Elastic Supply

What is Economics About?

Greek Word

"Oikonomia"

Economics

Science of House Hold

What is Economics About?

Till 19th century, Economics was known as 'Political Economy.'

Adam Smith > 'An Inquiry into the Nature and Causes of the Wealth of Nations' in (1776) = 'The Wealth of Nations'

Definition of Business Economics

- Business Economics is the use of economic analysis to make business decisions involving the best use of an organization's scarce resources.

- Joel Dean > Business Economics in terms of the use of economic analysis in the formulation of business policies.

INTRODUCTION

- General definition of the study of Economics is individual and social choice in the face of scarcity.
- The law of scarcity implies that consumer's wants will never be completely satisfied.
- Economic problems arise due to two reasons (Fundamental Facts):
a) Unlimited wants
b) Scarce resources

Definition of Business Economics

- Evan Douglas > Business Economics is concerned with the application of economic laws, principles and methodologies to the managerial decision making process within a business firm under the condition of risk and uncertainties.

- Business Economics is Applied Economics.

Meaning of Business Economics

- Business Economics = Managerial Economics.
- It is application of economic theory and methodology to the business decisions.
-

Types of Economics / Subject Matter of Economics

Basis	Micro-Economics	Macro-Economics
Study of	It is study of individual economics units.	It is study of the economics as a whole and its aggregates.
Deal with	It deals with individual income, individual prices and individual output, etc.	It deals with national income, price level, national output, etc.
Tools	Its main tools are demand and supply of a particular commodity.	Its main tools are aggregate demand and aggregate supply of the economy as a whole.

Types of Economics / Subject Matter of Economics

Basis	Micro-Economics	Macro-Economics
Central problem	Its central problem is price determination of commodities of factor of production.	Its central problem is determination of level of income and employment.
Prices	Prices determined under this are called 'relative prices.'	Prices determined under this are called 'absolute price.'
Type of analysis	It is partial equilibrium analysis.	It is general equilibrium analysis.

Positive & Normative Science

Positive science	Normative science
Robbins	Alfred Marshall
What it is?	What should be? or What ought to be?
Based on analysis, facts, realistic	Based on ethics
Will not pass value Judgement (not give Solution)	Will pass value Judgement (gives solution)
e.g. India is an over populated country	Family planning should be started to control population
Deals CAUSE and EFFECTS only.	States what is right and what is wrong
It is DESCRIPTIVE in nature.	It is PRESCRIPTIVE in nature

Types of Economics / Subject Matter of Economics

Basis	Micro-Economics	Macro-Economics
Scope	Its scope is limited	It is wider in scope.
Example	- Lock out in TELCO. - Finding the causes of failure of X and CO. - Theory of product pricing/price theory - Theory of consumer behaviour - Theory of factor pricing - Study of a firm	- Per capita income. - Corporate income tax. - Economy growth. - Theory of national income, employment and money - Theory of general price level - Theory of economic growth and development - Theory of international trade

Scope of Business Economics

Micro-Economics is applied to operational or internal issues of a firm.

Macro-Economics is applied to environment or external issues on which the firm has no control.

Nature of Business Economics

- Business Economics is a Science
- Based on Micro Economics
- Incorporates elements of Macro Analysis
- Business Economics is an art
- Use of Theory of Markets and Private Enterprises
- Pragmatic in Approach
- Interdisciplinary in nature
- Normative in Nature

Operational or Internal Issues

- Demand analysis and forecasting
- Production and Cost Analysis
- Inventory Management
- Market structure and Pricing Analysis
- Resource Allocation
- Theory of Capital and Investment Decisions
- Profitability Analysis
- Risk and Uncertainty Analysis.

Environmental or External Issues

- The type of economic system
- Stage of business cycles
- The general trends in national income, employment, price, saving and investment.
- Government's economic policies
- Working of financial sector and capital market
- Socio-economic organizations
- Social and political environment.

Capitalist Economy

Merits:-

1. Greater efficiency & incentive to work hard
2. Faster economic growth possible
3. Consumer are benefitted because of good quality product
4. Higher standard of living
5. Innovation & technological progress

Central Economic Problems

- What to produce (capital goods, consumer goods)
- How to produce (capital surplus use capital, labor surplus use labor)
- For whom to produce (poor or rich, in India it gives to poor for upliftment)
- What provision should be made for economic growth

When are goods produced
How much to produce
} are not economic problems

Capitalist Economy

Demerits:-

1. Uneven distribution of Income & wealth
2. Income inequality & social injustice
3. Exploitation of consumer and laborer
4. Economic instability which may lead to depression
5. Creation of monopoly power

Other names for capitalist economy- Market economy, Market system, Free markets, Market mechanism, Price mechanism, Laisses-Fair Economy.

Examples: United States and United Kingdom, Hong Kong, South Korea etc. However, many of them are not pure form of capitalism but show some features of being a capitalist economy.

Capitalist Economy

Features:-

1. Means of production are privately owned
2. Freedom of enterprise & freedom of price choice
3. Allocation of resources is as per consumer preference
4. Entrepreneur are guided by profit motive
5. Competition exist among producers
6. Capitalist economy use price mechanism as a principle motive

Socialist Economy

- The concept of socialist economy was propounded by Karl Marx and Frederic Engels in their work 'The Communist Manifesto' published in 1848.
- In this economy, the material means of production i.e. factories, capital, mines etc. are owned by the whole community represented by the State.

Features:-

1. It is known as command economy, controlled economy, centrally planned economy
2. Collective ownership of means of production
3. Promote welfare of people
4. Lack of competition

Socialist Economy

Merits:-

1. Balance economic development
2. No class conflict
3. Economic Fluctuation & unemployment are minimized
4. Right to minimum work
5. No exploitation of consumer & worker

Mixed Economy

Merits:-

1. Freedom of occupation
2. Encourages enterprise & Risk taking
3. Development of technology through R & D
4. Economic & social equality possible

Socialist Economy

Demerits:-

1. Corruption, Red-tapism, results into inefficiency
2. No freedom of choice
3. Price are administered by state

The erstwhile U.S.S.R. was an example of socialist economy from 1917 to 1990.
In today's world there is no country which is purely socialist.
Other examples include Vietnam, China and Cuba.
North Korea, the world's most totalitarian state, is another example of a socialist economy.

Mixed Economy

Demerits:-

1. Poor implementation of plans
2. High level of taxes
3. Good level of corruption
4. Wastage of Resources

Mixed Economy is not always a 'golden path' between capitalism and socialism.

Mixed Economy

Features:-

1. Combination of both capitalism & socialism
2. Freedom to join any occupation trade or business
3. People are free to consume goods of their choice

Business Cycle

- Rhythmic fluctuations in aggregate economic activity that an economy experiences over a period of time are called business cycles or trade cycles or Economic cycle.
- Business cycle refers to alternate expansion and contraction of overall business activity.
- The Business Cycle is the periodic fluctuations in economic activity measured by the change in real GDP.
- Peak and trough are the Turning points of Business Cycle

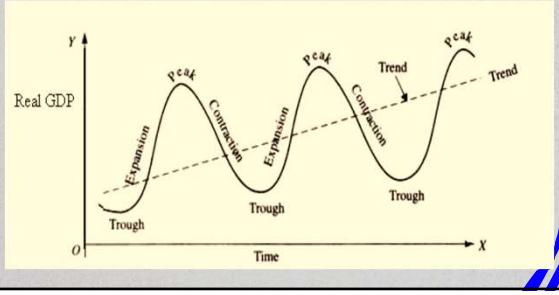
Phases of Business Cycle

- Expansion (also called Boom or Upswing)
- Peak or Boom or Prosperity
- Contraction (also called Downswing or Recession)
- Trough or Depression

Peak (Prosperity)

- Increase in input prices
- Increase in output prices
- Increased cost of living
- Actual demand stagnates
- Highest stage in business cycle
- Economy becomes overheated and unsustainable
- Highest GDP and Employment

Phases of Business Cycle



Contraction (Recession)

- Decrease in levels of investment and employment
- Decrease in input prices – Decrease in wage and interest
- Decrease in aggregate demand – Decrease in prices
- Decrease in cost: Decrease in profit expectations (pessimism)
- Supply far exceeds demand.
- Decrease in bank credit; stock prices fall
- Income of wage and interest earners gradually declines
- Excess production capacity during Contraction

Expansion

- Increase in national output, employment, aggregate demand in capital and consumer expenditure, sales, profit, stock prices and bank credit.
- **Full employment of resources** (involuntary unemployment =0).
- Increasing prosperity and high standard of living.
- Business confidence /Profits and Factor income also increases
- Only **Structural unemployment** (i.e. unemployment caused due to structural changes in the economy) and **Frictional unemployment** (i.e. due to change of jobs, or suspended work due to strikes or due to imperfect mobility of labour) can be seen.
- Growth ultimately slows down reaches peak.

Trough (Depression)

- Depression = severe form of recession
- Negative growth rate
- Decrease in level of National Income
- Expenditure declines rapidly
- Cost decreases – prices are at their lowest
- Firms shutdown
- Highest level of unemployment
- Decrease in interest rate – people's demand for holding liquid money (cash) increases

Recovery

- Business confidence takes off
- End of Pessimism and start of optimism
- Increase in income
- Increase in employment
- Aggregate demand increases
- Price increases
- Cost increases
- Banks expand credit

Types of Economic Indicators

Coincidental/Concurrent Indicators

Coincidental Indicators coincide or occur simultaneously with the business-cycle movements. In other words, these indicators give information about the rate of change of the expansion or contraction of an economy more or less at the same point of time it happens.

Gross Domestic Product, Industrial Production, Inflation, Personal Income, Retail Sales Financial Market Trends Such As Stock Market Prices.

Types of Economic Indicators

Leading Indicators

A leading indicator is a measurable economic factor that changes before the economy starts to follow a particular pattern or trend.

In other words, those variables that change before the real output changes are called 'Leading indicators'.

Changes In Stock Prices, Profit Margins And Profits, Indices Such As Housing, Interest Rates And Prices Value Of New Orders For Consumer Goods, New Orders For Plant And Equipment, Building Permits For Private Houses, Fraction Of Companies Reporting Slower Deliveries, Index Of Consumer Confidence And Money Growth Rate

Features of Business Cycle

- Business cycles occur periodically although they do not exhibit the same regularity. The duration of these cycles vary. The intensity of fluctuation also varies.
- Business cycles have distinct phases of expansion, peak, contraction and trough. These phases seldom display smoothness and regularity. The length of each phase is also not definite.
- Business cycles generally originate in free market economies. They are pervasive as well. Disturbances in one or more sectors get easily transmitted to all other sectors.
- Some sectors such as capital goods industries, durable consumer goods industry, etc. are disproportionately affected. Moreover, compared to agricultural sector, the industrial sector is more prone to the adverse effects of trade cycles.

Types of Economic Indicators

Lagging Indicators

Lagging indicators reflect the economy's historical performance and changes in these indicators are observable only after an economic trend or pattern has already occurred. In other words, variables that change after the real output changes are called 'Lagging indicators'.

Unemployment, Corporate Profits, Labor Cost Per Unit Of Output, Interest Rates, The Consumer Price Index, Commercial Lending Activity

Features of Business Cycle

- Complex phenomena - they do not have uniform characteristics and causes. Therefore, it is difficult to make an accurate prediction of trade cycles.
- Repercussions of business cycles get simultaneously felt on nearly all economic variables viz. output, employment, investment, consumption, interest, trade and price levels.
- Business cycles are contagious and are international in character. They begin in one country and mostly spread to other countries through trade relations.

Causes of Business Cycle

- **Internal Causes**
- Fluctuations in Effective Demand:- Keynes
- Fluctuations in Investment:
- Variations in Government Spending:
- Macro-Economic Policies:
- Money Supply:- **Hawtrey**
- Psychological Factors:- Pigou - optimism or pessimism, Schumpeter - innovation theory, Nicholas Kaldor - cobweb theory

Types of Utility

- Form Utility:- (Changing the form of Natural Resource.)
- Place Utility:- Extraction from Earth, Transfer of Goods
- Time Utility:- (It is created by making things available when they are required.)
- Service Utility:- (Service Utility is created by some special skills or knowledge.)

Causes of Business Cycle

- **External Causes**
- Wars
- Post War Reconstruction
- Technology Shocks
- Natural Factors
- Population Growth

Factors of Production

- Land
- Labor
- Capital
- Entrepreneurship

Meaning of Production

Input	Process	Output
Raw Material	Process	Finished Goods
Creation	Or Addition	Of Utility

Land

- Primary Factor
- Free Gift of Nature
- Inelastic Supply
- Lacks Geographical Mobility
- Passive Factor
- Heterogeneous
- Permanent
- Diminishing Returns

Labour

- Labour is inseparable from labourer
- Human Factor
- Highly perishable
- The labourer sells his services and not himself
- Heterogeneous
- Restricted Mobility
- Active Factor
- Labour has sociological characteristics
- Supply curve of labour is backward sloping
- The supply of labour is inelastic in short run

Types of Capital

- From the View Point of Convertibility:-
- Fixed capital
- Circulating or Working Capital
- From the View Point of Purpose of Use:-
- Sunk Capital
- Floating Capital
- From the View Point of Thing or Human:-
- Real capital
- Human capital

Capital

- In ordinary language, capital is used in the sense of money.
- But in economics the term 'Capital' means man made stock of goods like factories, machines, tools, equipment, etc. which are used in production.
- Capital has therefore, been rightly defined as "produced means of production" and as "man made instrument of production".

Types of Capital

- From the View Point of Tangibility:-
- Tangible capital
- Intangible capital
- From the View Point of Expected Return:-
- Money capital
- From the View Point of Ownership:-
- Individual capital
- Social capital

Capital

- Capital is man-made
- Capital is productive
- Supply of capital is elastic
- All capital is wealth
- Capital is a passive factor
- Capital is the most mobile factor
- Capital is durable
- Capital involves social cost - Sacrifice of present consumption

Capital Formation

- Capital formation means a sustained increase in the stock of real capital in a country.
- Capital formation is also known as investment.
- There are mainly three stages of capital formation which are as follows:
- a) Savings.
- b) Mobilization of savings
- c) Investments.

Entrepreneurship

- The entrepreneur owns entrepreneurship.
- He is that man of production who takes decisions and bears risk.
- He has also been called the **organizer, the manager** or **risk taker**.
- **Functions of an entrepreneur:**
- Initiating a business enterprise and coordination:
- Risk bearing and uncertainty:
- Innovation:

Short Run

- It is the time period in which out put can be changed by changing only the variable factors of production.
- Fixed factors remain fixed.

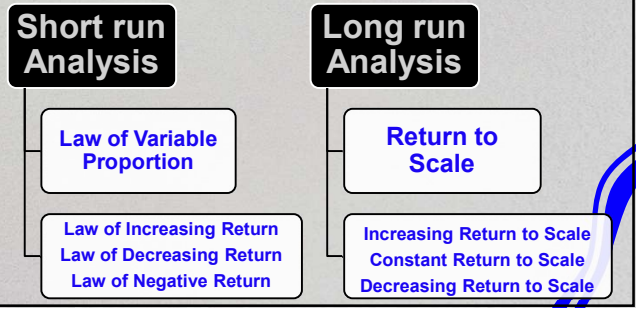
Production Function

- Production function states the **relationship between inputs and outputs**, i.e., the amount of output that can be produced with given quantities of inputs under a **given state of technical knowledge**.

Long Run

- It is the time period in which the out put can be changed by changing all the factors of production i.e. fixed & variable in same proportion.
- No factor remains fixed.

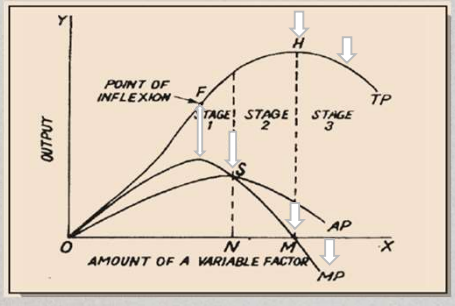
Production Function



Law of Variable Proportion

Labour	TP	AP	MP
1	2	2	2
2	5	2.5	3
3	9	3	4
4	12	3	3
5	14	2.8	2
6	15	2.5	1
7	15	2.1	0
8	14	1.7	−1
9	12	1.3	−2

Law of Variable Proportion



Cobb-Douglas Production Function

- $Q = K L^{a} C^{(1-a)}$
- Where 'Q' is output, 'L' the quantity of labour and 'C' the quantity of capital.
- 'K' and 'a' are positive constants.
- In this equation, labour contributed 3/4th and capital contributed 1/4th of production.
- The function is linear and homogeneous.
- It shows constant returns to scale, so it is called "Linear Homogeneous Production Function".

Relationship Between AP & MP

- Both AP and MP can be calculated by TP.
- When AP rises, the MP also rises but MP > AP
- When AP is maximum, the MP = AP or say MP curve cuts the AP curve at its maximum point.
- When AP falls, then MP also falls, but MP < AP
- There may be a situation when MP decreases and AP increases, but opposite never happenes.

ISO Quant

- Equal product curve
- Iso product curve
- Production Indifference curve
- Iso quant shows various combinations of two inputs (capital / Labour) that gives same level of output

Combinations	Labour	Capital	DMRTS(Lk)
A	1	12	
B	2	6	6
C	3	4	2
D	4	3	1

Law of Returns to Scale

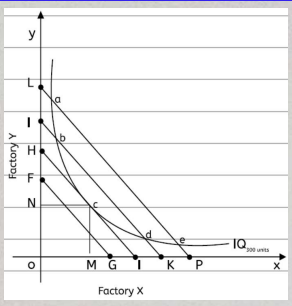
Change in Scale (Variable + Fixed) → Change in Out put

- Increasing Return to Scale:
- It refers to output increase in greater proportion than increase in input.
- Constant Return to Scale:
- It means output increase in the same proportion as input increases
- Decreasing Return to Scale:
- It refers to output increase in smaller proportion than increase in input.

ISO Cost

- ISO -cost line also known Equal Cost Line; Price Line; Outlay Line; Factory Line
- It shows the various combinations of two factor inputs which the firm can purchase with a given outlay (i.e. budget) and a given prices of two inputs.

Producer's Equilibrium



Types of Cost

Direct Cost	Indirect Cost
Direct cost is also known as "Traceable cost".	Indirect cost is also known as "non-traceable cost".
Cost which can be easily identified called as direct cost.	Cost which cannot be easily identified called non-traceable / indirect cost.
In production of shoes cost of leather is a direct cost.	Electricity, Power charges

Types of Cost

Accounting Cost/ Explicit Cost	Implicit Cost
Accounting cost / explicit cost are that cost which is incurred on those factors that are not owned by entrepreneur. He has to purchase from outside.	Implicit cost is that cost which is incurred by an entrepreneur on those factor which are owned by him
Recorded in books of account	Not recorded in books of account
Out of the pocket expenditure	They are not out of the pocket expenditure. Also known as opportunity cost.
Raw material, Rent paid, Printing & Stationary cost.	Owned property, Owned capital
Economic Cost Explicit Cost + Implicit Cost = Economic cost	

Types of Cost

Incremental Cost	Sunk Cost
Incremental cost is related to concept of marginal cost. It refers to the total additional cost incurred by the business.	Sunk cost refers to that cost which has been already incurred for one purpose in the past & cannot be recovered.
Purchase of new equipment, expansion of production capacity	Expense on advertisement.

Types of Cost

Outlay Cost	Opportunity Cost
It involves actual outlay of funds on wages material, rent known as "Financial expenditure"	Opportunity cost is a sacrifice or loss of alternative. Value of next best alternative. Known as Trade off, Forgone cost, Implicit cost.

Types of Cost

Historical Cost	Replacement Cost
Historical cost are those cost which are incurred on the purchase of an asset in the past, may or may not be recovered.	Replacement cost refers to expenditure to be made for replacing an old asset.
Machinery, Tools	Replacement of an old Machine

Types of Cost

Private Cost	Social Cost
Private cost are those cost which are incurred or provided by the firm or organization.	Social cost refers to the total cost to the society due to business activities it includes both private & external cost.
Cost of manufacturing a product	Pollution of all types

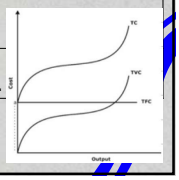
ECONOMIES & DISECONOMIES

When the activity of the firm increase or activity of the industry increase than the firm gets benefit or advantage out of it. It is known as Economies

Internal Economies & Diseconomies	External Economies & Diseconomies
(i) Technical (ii) Managerial (iii) Commercial (iv) Financial (v) Risk Bearing	(i) Cheaper raw material and capital equipment (ii) Technological (iii) Development of skilled labour (iv) Growth of ancillary industries (v) Better transportation & Marketing facilities

Types of Cost

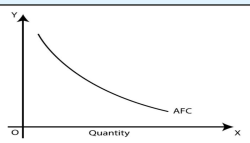
Fixed Cost	Variable Cost
Fixed cost do not change with change in output	Variable cost changes with change in output
It is independent of output	Dependent on output
It cannot become zero also known as supplementary cost or overhead cost.	It can become zero also known as prime cost.
Rent, Property tax, Interest on Capital, Depreciation	Wages, Raw Material etc.



Average Fixed Cost

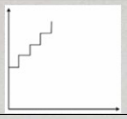
- Average Fixed Cost is the fixed cost per unit of output. Thus,
- Average Fixed Cost = Total Fixed Cost / Total Input
- OR AFC = TFC / Q

Output (units)	T F C (Rs.)	A F C (Rs.)
0	60	-
1	60	60
2	60	30
3	60	20
4	60	15
5	60	12
6	60	10



Types of Cost

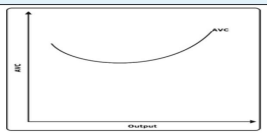
Semi-Variable Cost	Stair-step Variable Cost
It is a mixture of fixed cost & variable cost.	A salary or Remuneration give to a foreman or extra helper represent stair step cost.
Electricity charges , Post paid Mobile connection	



Average Variable Cost

- Average Variable Cost is the variable cost per unit of output. Thus,
- Average Variable Cost = Total Variable Cost / Total Output OR AVC = TVC / Q

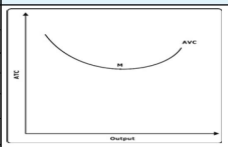
Output (units)	TVC (Rs.)	AVC (Rs.)
0	0	-
1	40	60
2	76	38
3	102	34
4	132	33
5	170	34
6	22	37



Average Total Cost

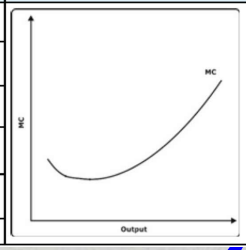
- Average Total Cost is the cost per unit of output. Thus,
- Average total cost or Average cost = Total Cost / Total Output
- ATC OR AC = TC / Q ATC OR AC = TFC / Q + TVC / Q
- ATC or AC = AFC + AVC

Output (units)	TC (Rs.)	ATC (Rs.)
0	60	-
1	100	100
2	136	68
3	162	54
4	192	48
5	230	46
6	282	47



Marginal Cost

Output (units)	TFC (Rs.)	TVC (Rs.)	TC (Rs.)	MC (Rs.)
1	30	50	80	-
2	30	90	120	40
3	30	120	150	30
4	30	170	200	50
5	30	250	280	80
6	30	360	390	110

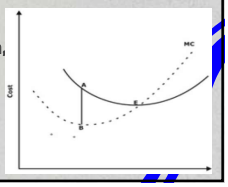


Marginal Cost

- Marginal cost is addition to the total cost caused by producing one more unit of output.
- Thus, marginal cost is the cost of the additional unit of output.
- It is measured by the change in total cost resulting from a unit increase in output.
- MCn = TCn – TCn-1 Or MC = ΔTC / ΔQ

Relationship between AC & MC

- MC and AC both can be calculated by TC.
- When AC falls, MC also falls, but AC > MC.
- When AC rises, MC also rises, but now MC > AC.
- When AC is minimum, then MC = AC. In other words, MC curve cuts to AC curve at its minimum point (i.e., optimum point).
- There is also abnormal situation when AC falls and MC rises. In the figure given, from 'A' to 'E' AC falls but from 'B' to 'E' MC rises. But, opposite never happened.

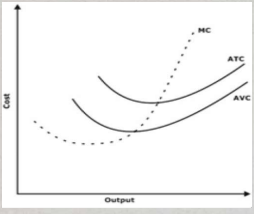


Marginal Cost

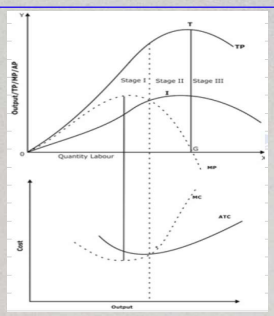
- The Marginal Cost is INDEPENDENT OF FIXED COST
- In the short period, total fixed cost are constant for all levels of output.
- The only change in total cost when output changes is CHANGE IN VARIABLE COST.
- Hence, marginal cost is affected only by the variable cost.
- Therefore marginal cost can also be defined as a change in TVC as a result of a unit change in output.

Relationship between AC, AVC & MC

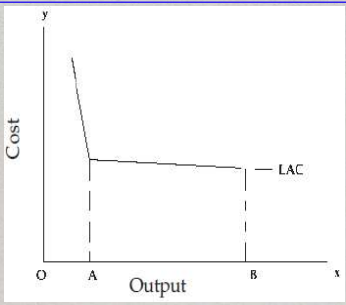
- ATC = AVC + AFC, but ATC ≠ AVC, so AVC curve can never touch to ATC curve.
- MC cuts to ATC and AVC's minimum points.



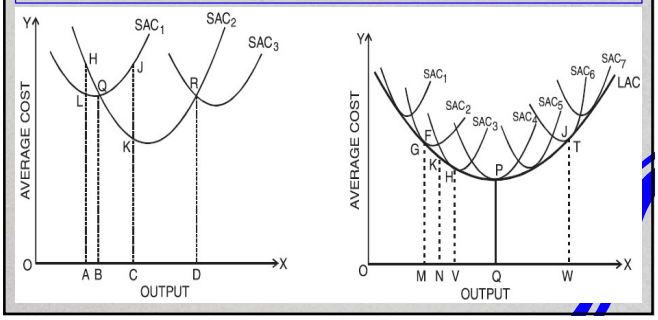
Why are ATC, AVC & MC Curves 'U' Shaped?



'L' Shaped Cost Curve



Long Run Average Cost Curve



MEANING OF MARKET

- The market simply means as all those buyers and sellers of a good or service who influence the price.

Long Run Average Cost Curve

- The LAC curve **envelopes** infinite short run average cost curves each representing a plant. Hence, SACs are also called plant curves.
- The Fig., shows that LAC curve is **not tangent to the minimum points** of the SAC curves.
- When LAC curve is **sloping downwards**, it is tangent to **falling portions** of SACs.
- When LAC curve is **rising upwards**, it is tangent to **rising portions** of SACs.

THE ELEMENTS OF A MARKET

(i) buyers and sellers;
(ii) a product or service;
(iii) bargaining for a price;
(iv) knowledge about market conditions; and
(v) one price for a product or service at a given time.

ON THE BASIS OF AREA

- Local: Perishable & Bulky goods
- Regional: Semi-durable goods
- National: Durable goods
- International: Precious goods

ON THE BASIS OF REGULATION

- Regulated Market: Transactions are statutorily regulated
- Unregulated Market: No restriction on the transaction

ON THE BASIS OF TIME

- Very short period: Perishable goods
- Short period: Only variable factors change to affect prices
- Long Period: Supply can be increased by installing plant and machinery
- Very long period: Change in factors like population, capital supply, supply of raw material

ON THE BASIS OF VOLUME OF BUSINESS

- Whole sale Market: Commodities are bought & sold in bulk
- Retail Market: Commodities are sold in small quantities

ON THE BASIS OF NATURE OF TRANSACTIONS

- Spot Market: Goods physically transacted on the spot
- Future Market: Contracts of future date

ON THE BASIS OF COMPETITIONS

- Perfect Competition
- Imperfect competition

$MR = AR \times \frac{e-1}{e}$, Where e = price elasticity of demand

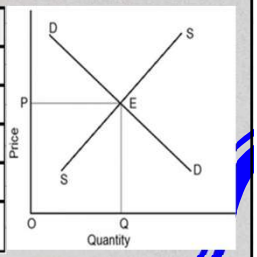
Thus if e = 1, $MR = AR \times \frac{1-1}{1} = 0$.

and if e >1, MR will be positive

and if e <1, MR will be negative

Equilibrium Price

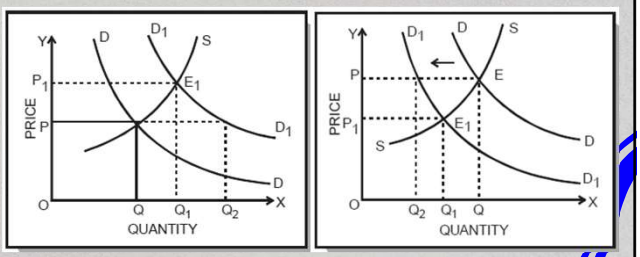
Equilibrium price	Demand (units)	Supply (units)	Analysis
1	50	10	Excess
2	40	20	Demand
3	30	30	P = 3= D = S
4	20	40	Excess
5	10	50	Supply



Behavioural Principles

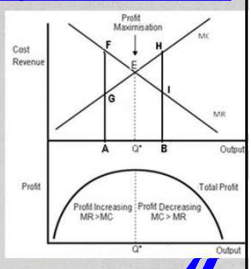
- **Principle 1:**
- **A firm should produce if TR ≥ TVC (Price ≥ AVC).**
- **If TR = TVC, firm's maximum loss will be equal to its fixed cost.**
- **P > AVC = Continue Production**
- **P = AVC = Firm Encounters Shut-Down Point**
- **P < AVC = Firm Should Shut-Down**

Increase & Decrease in Demand

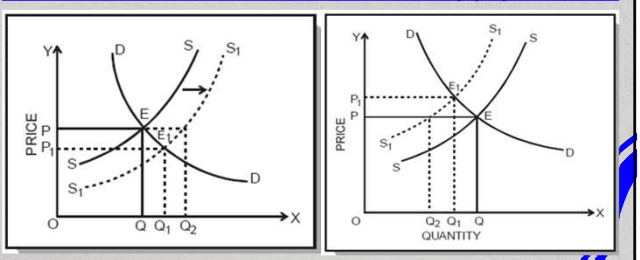


Behavioural Principles

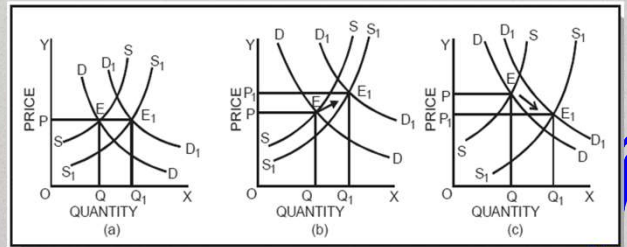
- **Principle 2:**
- **MR > MC = Increase Output**
- **MR = MC = Equilibrium Point**
- **MR < MC = Decrease Output**
- **MC curve should cut to MR from below.**



Increase & Decrease in Supply

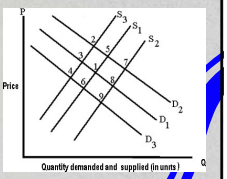


Simultaneous Changes in Demand & Supply



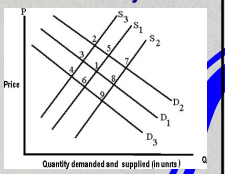
Simultaneous Changes in Demand & Supply

- Heavy rains in Maharashtra during 2005 and 2006 caused havoc with the rice crop. What point in the figure above is most likely to be the new equilibrium price and quantity?



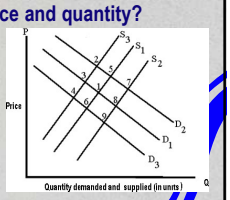
Simultaneous Changes in Demand & Supply

- Assume X is a normal good. Holding everything else constant, assume that income rises and the price of a factor of production also increases. What point in the figure above is most likely to be the new equilibrium price and quantity?



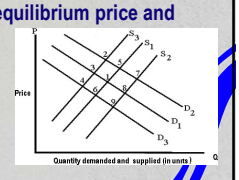
Simultaneous Changes in Demand & Supply

- Assume that consumers expect the prices of new cars to significantly increase next year. What point in the figure above is most likely to be the new equilibrium price and quantity?



Simultaneous Changes in Demand & Supply

- We are analyzing the market for good Z. The price of a complement good, good Y, declines. At the same time, there is technological advance in the production of good Z. What point the figure above is most likely to be the new equilibrium price and quantity?



Perfect Competition

- Characteristics:-
- Large number of buyers and sellers
- Homogeneous product
- Free entry and exit
- Perfect knowledge
- Perfect mobility
- Uniform price
- No government restrictions
- Industry is price maker and firm is price taker
- Transportation cost and selling costs are not found

Pure/Free Competition

- Characteristics:-
- Large number of buyers and sellers
- Homogeneous product
- Free entry and exit of firms

Profit/Loss Under Perfect Competition

- Average cost = AFC + AVC
- 20,000 = 8000 + 12000

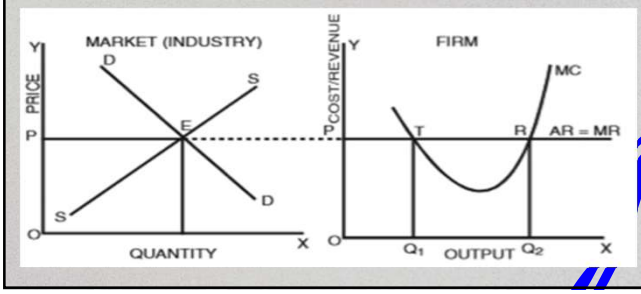
Case	AR	AC	Relation	
1	30000	20000	AR > AC	Super normal profit (Abnormal profit)
2	20000	20000	AR = AC	Normal profits (Zero economic profit)
3	15000	20000	AC>AR>AVC	Sub normal profit
4	12000	20000	AC>AR=AVC	Maximum bearable loss
5	10000	20000	AC>AR<AVC	Shut down point

Equilibrim Under Perfect Competition

- The firm is at equilibrium when it maximises its profit.
- The output which helps the firm to maximise its profit is called equilibrium output.
- There are two conditions for the equilibrium of a firm. They are –
- a. MR = MC. (first order condition)
- b. Firm's MC curve should cut its MR curve from below i.e. marginal cost curve should have positive slope at the point of equilibrium. (Second order condition)

- When Firm's AR > AC, Firm Earns Supernormal Profit
- When Firm's AC = AR, Firm Earns Normal Profit
- When Firm's AC > AR, Firm Makes Loss
- In the short run, the firm may earn Supernormal Profit, Normal Profit or May Make Loss, but in the long run, the firm earns only Normal Profit

Equilibrim Under Perfect Competition



Monopoly

- Firm = Industry
- Relatively inelastic demand curve (AR)
- Price maker
- AR > MR
- Monopolist can decide both Price and Output (But not at the same time)

How do Monopolies Arise?

- Strategic control over scarce resources or technology
- Developing or acquiring control over a product that is difficult or costly for others to copy
- Exclusive rights granted by government to produce and sell
- Patents and copyrights
- Business combinations or cartels

- AR and MR are both negative sloped (downward sloping) curves.
- MR curve lies half-way between the AR curve and the Y axis. i.e. it cuts the horizontal line between Y axis and AR into two equal parts.
- AR cannot be zero, but MR can be zero or even negative.

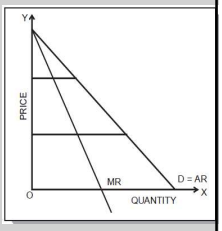
How do Monopolies Arise?

- Extremely large start-up costs and requirement of extraordinarily costly and sophisticated technical know-how
- Natural monopoly
- Enormous goodwill enjoyed by a firm
- Stringent legal and regulatory requirements
- Use of various anti-competitive practices (e.g. predatory pricing)

- In the Short Run, the Monopoly Firm may make Supernormal Profit, Normal Profit or Loss.
- Monopoly is the only firm which makes Supernormal Profit in the Long Run also.

MONOPOLIST'S REVENUE CURVES

- Since the monopolist firm is assumed to be the only producer of a particular product, its demand curve is identical with the market demand curve for the product.



PRICE DISCRIMINATION

- Price discrimination is a method of pricing adopted by the monopolist in order to earn abnormal profit.
- It refers to the practices of charging different prices for the different unit of the same commodity.

CONDITIONS FOR PRICE DISCRIMINATION

- Monopoly power in some form is necessary (not sufficient) to discriminate price.
- The seller should be able to divide his market into two or more sub-markets.
- The price-elasticity of the product should be different in different markets.
- It should not be possible for the buyers of low-priced market to resell the product to the buyers of high-priced market.

Types of Price Discrimination

- Third Degree Price Discrimination:-
- Market is divided into different segments on the basis of age, use, gender, etc. and a different price is charged from each segment of the market.
- For Example, railways, electricity, etc.
- Different Price in different Submarkets.

Types of Price Discrimination

- First Degree Price Discrimination:-
- Monopoly fixes a very high price which makes consumer surplus zero.
- For Example, personalized services like that of a doctor, teacher, lawyers, etc.
- Takes away entire Consumer Surplus.

Objectives of Price Discrimination

- To maximize profit
- To sell off surplus stock
- To enjoy economies of scale (to reduce cost of production)
- To capture foreign market
- To secure equity through pricing (equitable distribution of income)

Types of Price Discrimination

- Second Degree Price Discrimination:-
- Here price varies according to the quantity of output purchased
- For Example, wholesale and retail buying.
- High Price is Charged which will take away a part of Consumer Surplus.

Imperfect Competition/Monopolistic Competition

- This is a market structure which contains the characteristics of both perfect competition and monopoly.
- It is observed very commonly in the real world.
- Examples of monopolistic competition in India include the soap industry, toothpaste industry, biscuit industry, etc.

Features of Monopolistic Competition

- Large number of buyers and sellers
- Product Differentiation
- Free Entry and Exit of Firms
- Selling Costs
- Relatively elastic demand curve
- Concept of Group exist
- Concept of Brand exist under monopolistic competition
- Non price competition
- Close Substitutes
- Price Maker and Price taker of its own Product

- In the Short Run, the Firm Under Monopolistic Competition may make Supernormal Profit, Normal Profit or Loss.
- But in the Long Run, the firm earns Normal Profit only.
- And the Excess Capacity exists in the firm. It means that the firm does not make full capacity output.

PRICE-OUTPUT DETERMINATION UNDER MONOPOLISTIC COMPETITION : EQUILIBRIUM OF A FIRM

OLIGOPOLY

- Each firm is a price maker and is in a position to determine price of its own product.
- As such, the firm is faced with a downward sloping demand curve for its product.
- Generally, the less differentiated the product is from its competitors, the more elastic this curve will be.

- Oligopoly is often described as 'competition among the few'.
- In other words, when there are few (two to ten) sellers in a market selling homogeneous or differentiated products, oligopoly is said to exist.
- Prof. Stigler defines oligopoly as that "situation in which a firm bases its market policy in part on the expected behavior of a few close rivals".

Characteristics of Oligopoly

- Few Number of Sellers - 2 to 10 (Competition among Few)
- Homogeneous or Differentiated Product
- Importance of Advertising / Selling Costs
- Interdependence
- Group Behaviour
- Price Rigidity
- No free entry, No blocked entry
- Kinked demand curve

Types of Oligopoly

- Collusive Oligopoly:-
- When the few firms in the oligopoly market come to a common understanding or act in collusion with each other with regard to price fixation, market sharing, profit sharing, etc. it is a case of collusive oligopoly.
- Competitive Oligopoly:-
- When few firms in the oligopoly market compete with each other it is known as competitive oligopoly.

Types of Oligopoly

- Pure / Perfect Oligopoly:-
- It is a situation in which all firms in the market sell homogenous goods.
- Differentiated / Imperfect Oligopoly:-
- It is a situation in which all firms in the market sell differentiated goods.

Types of Oligopoly

- Partial Oligopoly:-
- When oligopoly industry is dominated by one large firm which is looked upon as a leader, it is a case of partial oligopoly.
- Full Oligopoly:-
- When there is no price leader and all firms are equally dominant, it is a case of full oligopoly.

Types of Oligopoly

- Open Oligopoly:-
- If new firms can enter in an oligopoly market it open oligopoly.
- Closed Oligopoly:-
- If new firms cannot enter an oligopoly market it closed oligopoly.

Types of Oligopoly

- Syndicated Oligopoly:-
- A situation in which firms sell their products through a centralized syndicate. Eg: OPEC
- Organized Oligopoly:-
- A situation where the firms organize themselves into a central association for fixing prices, output, etc.

Game Theory in Oligopoly

- Theory of Games provide a different approach to the analysis of strategic behavior of the oligopolists under uncertainty.
- It was developed by Von Neumann and Oskar Morgentern in 1944.
- The subject of Games Theory is rational behavior in situations of conflicts- military combat, political rivalry, struggles of firms for sales and profits.
- Economic theory situations of duopoly and oligopoly often fit into this category.
- Oligopolistic firms also select strategies in the face of uncertainty as to how their rivals will respond to their actions.

Other Forms of Competition

- **Duopoly:** It is a market situation in which there are only two firms in the market
- **Monopsony:** It is a market which has only one Single buyer of a Product or Service
- **Oligopsony:** It is a market which has Small number of Large buyers
- **Bilateral Monopoly:** In this market there is only a single buyer and single Seller (Monopoly market + Monopsony Market)

KINKED DEMAND CURVE

- It has been observed that in many oligopolistic industries prices remain sticky or inflexible for a long time.
- the most popular explanation is kinked demand curve hypothesis given by an American economist Sweezy.
- Hence this is called Sweezy's Model.

THANK YOU

- Each oligopolist believes that if he lowers the price, its competitors will follow him.
- If he raises the price, its competitors will not follow him.